CARBOFURAN 10 GR

Reg. No.: L 8547 Act /Wet No. 36 of/van 1947

A systemic granular insecticide and nematicide for the control of pests in maize, potatoes and sugarcane as indicated.

‘n Sistemiese korrel insek- en aalwurmdoder vir die beheer van plae in mielies, aartappels en suikerriet soos aangedui.

| IRAC INSECTICIDE GROUP CODE: | 1A | IRAC INSEKDODERGROEP KODE: |

ACTIVE INGREDIENT/ AKTIEWE BESTANDDEEL:
carbofuran (carbamate) / karbofuran (karbamaat) .......... 100 g/kg

Registration holder / Registrasiehouer:
ARYSTA LifeScience South Africa (Pty) Ltd
7 Sunbury Office Park,
Off Douglas Saunders Drive, La Lucia Ridge,
South Africa, 4019
Tel: 031 514 5600

Contents/Inhoud

| Batch No. / Lot Nr.: |
| Date of manufacture: / Datum van vervaardiging: |

U.N. No. 2757

READ THE LABEL IN DETAIL BEFORE OPENING THE CONTAINER. / LEES DIE ETIKET VOLLEDIG VOORDAT DIE HOUER OOPGEMAAK WORD.
For full particulars, see enclosed leaflet. / Vir volledige besonderhede, sien ingeslote pamflet.
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HARMFUL SKADELIK

WARNINGS:

MAIZE:
• Apply only at planting time.
• Do not allow animals to feed on treated maize or make silage within 8 weeks after application under normal rainfall conditions. Should drought conditions prevail after application contact your nearest Arysta Lifescience South Africa representative before using the plants as a fodder.
• Control of stalkborer may start declining 7 – 8 weeks after application.
• Leafhopper (vector of streak disease in maize) control may not be adequate and streak disease may occur especially on susceptible cultivars, particularly sweetcorn varieties and parent breeding lines in seed maize. This is particularly so when streak disease pressure is high as a result of close proximity of host plants (wheat, sugarcane) and mid-summer planting when natural populations of leafhoppers are high and CARBOFURAN 10 GR is used in soils of high pH.
• Application for black maize beetle is extremely critical. Ensure applicator is correctly calibrated and flow of granules checked regularly during application. Under conditions of high beetle population pressure up to 20 % and more damage of plants may still occur after treatment.

POTATOES:
• Apply only at planting time and do not harvest within 90 days after application.

SUGARCANE:
• Apply only at planting time or apply on ratoon cane within 120 days after cutting previous crop.
• At planting make sure that sets are placed at least 7,5 cm beneath the soil surface.
• Apply only once per crop and allow at least 180 days between application and harvest.

GENERAL WARNINGS:
• Handle with extreme care.
• Poisonous if it comes into contact with the skin, swallowed or inhaled.
• Toxic to fish, bees and wildlife. To prevent poisoning of birds, ensure that all granules are immediately covered by soil. Take special precautions at the end of planting rows where spillage may occur.
• Inform labour force of the potential danger of the product and give full instruction what to do in the case of poisoning. Mark treated areas with appropriate signs.
• Ensure that no edible crop is planted within 100 days within 10 m from the treated area.
• The efficacy of CARBOFURAN 10 GR can be adversely affected when used in alkaline or brackish soils with a pH > 7.
• Do not use CARBOFURAN 10 GR as a seed treatment.
• Keep under lock and key and out of reach of children, uninformed persons and animals.
• Re-entry interval: Wear rubber gloves and boots when working with treated soil or irrigating, for at least 30 days after application.
• In case of poisoning CALL A DOCTOR AND MAKE THIS LABEL AVAILABLE TO HIM/HER.

Although this remedy has been extensively tested under a large variety of conditions, the registration holder does not warrant that it will be efficacious under all conditions because the action and effect thereof may be affected by factors such as abnormal soil, climatic and storage conditions, incompatibility with other substances not indicated on the label and the occurrence of resistance of the pest to the remedy concerned as well as by the method, time and accuracy of application. The registration holder furthermore does not accept responsibility for damage to crops, vegetation, the environment or harm to man or animal, or for lack of performance of the remedy concerned due to failure of the user to follow the label instructions, or to the occurrence of conditions which could not have been foreseen in terms of the registration. Consult the supplier in the event of any uncertainty.

PRECAUTIONS:
• Avoid skin contact and the inhalation of dust.
• Wear suitable protective clothing, rubber boots and gloves, a suitable respirator and face shield when handling the product. Wash contaminated clothing daily.
• Do not eat, drink or smoke during handling, applying or before washing hands and face.
• Wash hands and face with soap and cold water after use or in case of accidental skin contact.
• Prevent contamination of food, feed, drinking water and eating utensils.
• Prevent contamination of areas that are not under treatment, crops, grazing, rivers, dams or any other water source.
• Clean applicator thoroughly after use and dispose of wash water where it will not contaminate crops, grazing, rivers or dams.
• Empty container completely by shaking it over the applicator's hopper.
• Destroy the empty container and do not re-use for any other purpose.
• Keep unprotected persons away from operating area.

Symptoms of human poisoning:
Headache, fatigue, faintness, giddiness, excessive sweating, nausea, abdominal pain, vomiting, blurred vision, muscle twitching, usually small pupils, respiratory distress and coma.

First aid treatment:
• Remove patient from source of poisoning and keep patient quiet and reassured.
• Remove contaminated clothing and wash contaminated body area with plenty of cold water and soap. Do not rub skin. If in eyes rinse out for at least 15 minutes in clean running water.
• If swallowed induce vomiting by tickling the back part of the throat. Repeat until vomit is clear and free from smell of poison.
• Administer artificial respiration or closed cardiac massage if necessary. Do not apply direct mouth-to-mouth respiration. Never give anything by mouth to an unconscious person.
• Get medical attention immediately.

Note to physician:
Give atropine sulphate 2 – 4 mg (adult) applied intravenously, repeated by 10 minute intervals until atropinization (dry, flushed skin and tachycardia) appears. Pralidoxime (2-PAM, Protopam) and other oximes are contra-indicated.

Resistance warning:
For resistance management, CARBOFURAN 10 GR is a group code 1A insecticide. Any insect population may contain individuals naturally resistant to CARBOFURAN 10 GR and other group
code 1A insecticides. The resistant individuals can eventually dominate the insect population if these insecticides are used repeatedly. These resistant insects may not be controlled by CARBOFURAN 10 GR or any other group code 1A insecticide.

To delay insecticide resistance:
- Avoid exclusive repeated use of insecticides from the same insecticide group code. Alternate with products from different insecticide group codes.
- Integrate the control methods (chemical, cultural, biological) into insect control programmes.

For specific information on resistance management contact the registration holder of this product.

DIRECTIONS FOR USE: Use only as indicated.

General:
1) Apply only by using a correctly calibrated granular applicator. Check delivery of granules several times during application. The downpipes of the applicator should be set at an angle which ensures a free, even flow of granules into the plant furrow. To avoid blockages regular checks should be made.
2) Sufficient soil moisture must be present to activate the active ingredient.
3) A remedy like SERVUS (Reg. No. L 7271) should be applied for the control of cutworm.
4) Under conditions of high pressure, black maize beetle might not be controlled sufficiently.

Compatibility:
CARBOFURAN 10 GR should not be mixed with granular fertilizer and applied with the same applicator.

APPLICATION RATES:

<table>
<thead>
<tr>
<th>CROP/PEST</th>
<th>DOSAGE</th>
<th>REMARKS</th>
</tr>
</thead>
<tbody>
<tr>
<td>MAIZE (including Sweetcorn)</td>
<td>100 g/100 m row</td>
<td>Apply only at planting in the plant furrow onto seed by means of a correctly calibrated granular applicator. Will also suppress nematodes and leafhopper. Refer to section under Maize under “WARNINGS”</td>
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<tr>
<td>False wire worms (Tenebrionidae spp) Maize rootworm (Buphonella nigroviolacea)</td>
<td>100 g/100 m row</td>
<td>Apply only at planting in the plant furrow onto seed by means of a correctly calibrated granular applicator. Will also suppress nematodes and leafhopper. Refer to section under Maize under “WARNINGS”</td>
</tr>
<tr>
<td>Nematodes (various spp.) Leafhopper (Cicadulina mbila) Ground weevils (Protostrophus spp.)</td>
<td>150 g/100 m row</td>
<td>Apply only at planting in the plant furrow onto seed by means of a correctly calibrated granular applicator. Will also control false wire worm and maize root worm and suppress stalk borer and black maize beetle. Refer to section Maize under “WARNINGS”</td>
</tr>
<tr>
<td>Astylus larvae Stalk borer (B. fusca) Black maize beetle (H. arator)</td>
<td>200 g/100 m row</td>
<td>Apply only at planting in the plant furrow onto seed by means of a correctly calibrated granular applicator. Under conditions of high population pressure of Astylus larvae and black maize beetle, control might not be sufficient. Where high infestation pressure of the above mentioned pests are expected, the seed should be treated with a registered remedy. False wire worm, maize root worm, nematodes, leafhoppers and ground weevils will be controlled by this treatment. Refer to section under Maize under “WARNINGS”</td>
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<td>POTATOES</td>
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<td>Black maize beetle (H. arator) Millipedes (Diploda spp.)</td>
<td>200 g/100 m row</td>
<td>Limited control for a limited period of time can be expected for the control of black maize beetle and millipedes. Apply only at planting on both sides of the plant furrow to ensure thorough mixing of the granules with the soil above the seed. Use other registered remedies for further control later in the season. Refer to section under potatoes and maize under “WARNINGS”</td>
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<tr>
<td>SUGARCANE</td>
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<tr>
<td>Nematodes (various spp.)</td>
<td>a. Plant cane 30 kg/treated ha</td>
<td>Apply at planting in the plant furrow by means of a suitable correctly calibrated granular applicator. Cover furrow immediately after planting. The rate per linear meter plant row depends on the row spacing: 3.0 g/m linear row for 1.0 m spacing 3.6 g/m linear row for 1.2 m spacing 4.2 g/m linear row for 1.4 m spacing 4.8 g/m linear row for 1.6 m spacing</td>
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<td></td>
<td>b. Ratoon cane 25 kg/treated ha</td>
<td>Apply by means of a suitable correctly calibrated granular applicator in a shallow furrow (5-10 cm deep) in moist soil to one or both sides of the furrow. Cover granules with soil. Application should take place in simmer immediately after cutting the crop while in crops cut in winter (May to August), application should take place not later than 120 days after cutting the crop when the first spring rain is expected. The rate per linear meter plant row depends on the row spacing: 2.5 g/m linear row for 1.0 m spacing 3.0 g/m linear row for 1.2 m spacing 3.5 g/m linear row for 1.4 m spacing 4.0 g/m linear row for 1.6 m spacing Refer to section under sugarcane under “WARNINGS”</td>
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